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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/572,593

08/14/2007

Robert James Kelly

KELL3013/JEK

3394

26582 7590 02/05/2009  
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EXAMINER

RABAGO, ROBERTO

ART UNIT

PAPER NUMBER

1796

MAIL DATE

DELIVERY MODE

02/05/2009

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/572,593	<b>Applicant(s)</b> KELLY ET AL.	
	<b>Examiner</b> Roberto Rábago	<b>Art Unit</b> 1796	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 29 October 2008.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1,3-5,7-12,14-21 and 23-26 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 7 and 9-12 is/are allowed.
- 6) ☒ Claim(s) 1,3-5,8,14-16,21 and 23-25 is/are rejected.
- 7) ☒ Claim(s) 17-20 and 26 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)            | 4) <input type="checkbox"/> Interview Summary (PTO-413)           |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)   | Paper No(s)/Mail Date. _____                                      |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>10/29/2008</u>  | 6) <input type="checkbox"/> Other: _____                          |

## **DETAILED ACTION**

### ***Information Disclosure Statement***

1. The information disclosure statement filed 10/29/2008 fails to comply with 37 CFR 1.98(a)(3) because it does not include a concise explanation of the relevance, as it is presently understood by the individual designated in 37 CFR 1.56(c) most knowledgeable about the content of the information, of each patent listed that is not in the English language. It has been placed in the application file, but the lined-through Mies reference has not been considered.

### ***Claim Rejections - 35 USC § 102***

2. Claims 1, 3-5, 21 and 23-25 are rejected under 35 U.S.C. 102(a) as being anticipated by WO 2004/047774 for the reasons set forth in item 2 of the Office action mailed 8/20/2008.

The claims have been amended to recite the composition as a film, fiber or membrane. The reference does not describe the hair styling gel as a film. However, upon further consideration, it appears that a hair coloring styling gel would inherently form a film on the surface of hair fibers when used as intended. Furthermore, the reference states in the paragraph bridging pages 9 and 10 that S-sulfonated keratin intermediate filament proteins have excellent film-forming properties, and therefore would be expected to form a film when used in a hair styling gel. The burden of proof is shifted to applicants to show otherwise.

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Claims 21 and 23-25 are rejected over this reference because the claims are silent as to the nature of the “monomer or polymer material” to which the keratin is bonded. Since keratin is itself a polymer made from monomer units, S-sulfonated keratin alone meets the claims because a first section of the keratin polymer is bonded to other sections of the same polymer. Neither the claims nor the specification requires that the monomer or polymer be different from an additional S-sulfonated keratin polymer fragment.

3. Claims 1, 3-5, 8, 14-16, 21 and 23-25 are rejected under 35 U.S.C. 102(a) as being anticipated by Katoh et al. (J. Applied Polymer Science 91 (2004) 756-762).

The reference discloses a mixture of S-sulfonated keratin and PVA which is formed into a fiber by wet spinning (see abstract). Although the reference does not state the limitations of claims 4 and 5, the reference method description at page 757 is consistent with the presence of intermediate filament proteins and intact keratin proteins. The burden of proof is shifted to applicants to show otherwise.

Claims 21 and 23-25 are rejected over this reference because the claims are silent as to the nature of the “monomer or polymer material” to which the keratin is bonded. Since keratin is itself a polymer made from monomer units, S-sulfonated keratin alone meets the claims because a first section of the keratin polymer is bonded to other sections of the same polymer. Neither the claims nor

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the specification requires that the monomer or polymer be different from an additional S-sulfonated keratin polymer fragment.

Applicants' priority application has been reviewed, but specific support for the language of the claims cannot be found, and therefore the reference, with an apparent publication date of January 15, 2004, is effective under 35 USC 102(a).

4. Claims 7 and 9-12 are allowed. Claims 17-20 and 26 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Roberto Rábago whose telephone number is (571) 272-1109. The examiner can normally be reached on Monday - Friday from 8:00 - 4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Wu can be reached on (571) 272-1114. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Roberto Rábago/  
Primary Examiner  
Art Unit 1796

RR  
February 2, 2009